

4.4 UTILITIES

The environmental impacts to water supply, wastewater treatment, solid-waste disposal, energy and communications are discussed below, in relation to the alternatives described in Chapter 2.

4.4.1 Alternative 1

Under this alternative, the construction and operation phases of several actions being considered and the possibility of mobilization requirements will potentially increase demands for all services. The possible actions include the paving of more than 20 miles of dirt and gravel roads on McGregor Range, a rail spur to McGregor Range Camp, a helicopter training complex, and a geothermal power generation and desalination plant. Any of these actions would increase demands for utilities on McGregor Range on both a temporary and permanent basis. Increases in personnel using the McGregor Range infrastructure under a mobilization scenario would also increase demands for utilities. It is likely that a greater number of military units and personnel will spend time at McGregor Range in wartime, which will require increased support staff and facilities. Mobilization personnel requirements have been estimated at up to 27,500 or slightly more than the strength of the installation in 1990. However, it is not possible at this time to definitively predict utility demand at McGregor Range by the potential number of additional personnel or the length of their stay.

Increased water and power demand could result in increased purchases from El Paso to approximate the 1990 levels and probably would require installation of additional lines to new locations. Expansion of existing wastewater treatment systems and installation of new systems in other areas of McGregor Range would be required. The USAF selected the Otero Mesa site on McGregor Range for its tactical target complex. There would be a significant increase in the amount of inert/subscale munitions expended on McGregor Range. Maintenance of the complex would result in a 30 percent increase (approximately 150,000 pounds per year) in the generation of nonhazardous scrap metal for the HAFB DRMO (USAF, 1998). This scrap metal increase would be significant for the HAFB DRMO, but would not pose an environmental threat or create additional environmental impacts on the Fort Bliss Training Complex or at HAFB. Increased solid waste disposal from possible future activities would require additional deliveries to the landfill near the Main Cantonment Area.

4.4.2 Alternative 2

Under this alternative, most current mission activities as well as most of the future increases in activities and construction as described in Section 2.1.1 would not be affected. Consequently, increased demands on utilities would be similar or slightly less than under Alternative 1.

4.4.3 Alternative 3

Under this alternative, current mission activities that use the Sacramento Mountains and Otero Mesa would be constrained or reduced, and some of the future increases in activities and construction as described in Section 2.1.1 would not be supportable under this alternative. Consequently, increased demands on utilities would be similar or slightly less than under Alternative 1.

4.4.4 Alternative 4

Under this alternative, current mission activities that use the area north of New Mexico Highway 506 and Otero Mesa would be constrained or reduced. Many future increases in activities and construction as described in Section 2.1.1 would not be supportable under this alternative, probably resulting in a small decrease in utility requirements.

4.4.5 Alternative 5 – No Action

Under this alternative, installation facilities on McGregor Range would be closed, with the exception of the McGregor Range Camp, McGregor ASP, and Meyer Range. Utility use for military purposes would be reduced.

4.4.6 Alternative 6

Under this alternative, impacts to utilities would be the same as under Alternative 3, 4, or 5, depending on the portion of the range that will continue to be withdrawn beyond 2001.

4.4.7 Cumulative Impacts

There are no cumulative impacts relating to utilities on McGregor Range, other than those relating to water supply. The El Paso/Fort Bliss regional water supply is affected by the cumulative effects of groundwater pumpage, mostly by El Paso, Texas, and Ciudad Juarez, Mexico. Pumpage from the Hueco Bolson aquifer exceeds recharge, which means that the aquifer is in overdraft condition and is experiencing accelerated rates of water-level decline (see Section 4.7). The lowering of water levels in the aquifer has permitted the infiltration of salt water into the fresh-water zones. It is estimated that the aquifer will be exhausted of recoverable fresh water between 2013 and 2025, which could result in a water-supply shortage in the area. Although municipal water will continue to be available from other sources, a short supply could increase costs to customers, including Fort Bliss. All water used for military purposes on McGregor Range is purchased by Fort Bliss from El Paso. No other utility is expected to experience noticeable cumulative effects.

4.4.8 Mitigation

In the absence of significantly adverse effects, mitigation will not be required for utilities, with the exception of water supply. The impact on water supply is primarily a water resource problem. Mitigation of water resources is discussed in Section 4.7.8.

4.4.9 Irreversible and Irretrievable Commitment of Resources

No irreversible or irretrievable commitment of resources would occur.